

## CLAIM OR CLAIMS

### WHAT IS CLAIMED IS:

1. A method of measuring relative channel delay between a pair of  
5 component signals of a video signal comprising the steps of:  
    removing a local mean from the pair of component signals to produce  
    a pair of filtered component signals;  
    obtaining a cross-correlation between the pair of filtered component  
signals;  
10      finding a centroid for the cross-correlation; and  
    converting the centroid to a delay time as a measure of the relative  
channel delay.
2. The method as recited in claim 1 further comprising the step of converting  
15 the pair of filtered component signals to absolute values prior to the obtaining  
step.
3. The method as recited in claims 1 or 2 wherein the finding step comprises  
the steps of:  
20      locating nearest zero-crossing on each side of a peak in the cross-  
correlation; and  
    finding the centroid between the nearest zero-crossings.

4. The method as recited in claim 3 further comprising the step of removing a sample offset from the centroid to provide a sample delay for input to the converting step.
- 5 5. The method as recited in claim 4 wherein the converting step comprises the step of dividing the sample delay by a sample rate to obtain the delay time.
6. The method as recited in claims 1 or 2 further comprising the step of  
10 removing a sample offset from the centroid to provide a sample delay for input to the converting step.
7. The method as recited in claim 6 wherein the converting step comprises the step of dividing the sample delay by a sample rate to obtain the delay  
15 time.